

LPDES PERMIT NO. LA0003042, A1 No. 11917

LPDES FACTSHEET
FOR THE DRAFT LOUISIANA POLLUTANT DISCHARGE ELIMINATION SYSTEM
(LPDES) PERMIT TO DISCHARGE TO WATERS OF LOUISIANA

- I. COMPANY/FACILITY NAME:** Louisiana Generating, LLC
 Big Cajun I Power Plant
 112 Telly Street
 New Roads, LA 70760
- II. ISSUING OFFICE:** Louisiana Department of Environmental Quality (LDEQ)
 Office of Environmental Services
 Post Office Box 4313
 Baton Rouge, Louisiana 70821-4313
- III. PREPARED BY:** Molly McKean
 Permits Division

Date Prepared: September 18, 2007

IV. PERMIT ACTION/STATUS:

A. Reason For Permit Action:

Proposed re-issuance of a Louisiana Pollutant Discharge Elimination System (LPDES) permit for a 5-year term following regulations promulgated at LAC 33:IX.2711.

* In order to ease the transition from NPDES to LPDES permits, dual regulatory references are provided where applicable. The LAC references are the legal references while the 40 CFR references are presented for informational purposes only. In most cases, LAC language is based on and is identical to the 40 CFR language. 40 CFR Parts 401, 405-415, and 417-471 have been adopted by reference at LAC 33:IX.4903 and will not have dual references. In addition, state standards (LAC Chapter 11) will not have dual references."

LAC 33:IX Citations: Unless otherwise stated, citations to LAC 33:IX refer to promulgated regulations listed at Louisiana Administrative Code, Title 33, Part IX.

40 CFR Citations: Unless otherwise stated, citations to 40 CFR refer to promulgated regulations listed at Title 40, Code of Federal Regulations in accordance with the dates specified at LAC 33: IX.4901, 4903, and 2301.F.

B. NPDES permit -

NPDES permit effective date: February 1, 1995
 NPDES permit expiration date: January 31, 2000
 EPA has not retained enforcement authority.

C. LPDES permit - (LA0003042)

LPDES permit effective date: September 1, 2002
 LPDES permit expiration date: August 31, 2007

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D. Application received on:

Permit application received on August 31, 2007. Permit application addendums received on January 28, 2008, February 26, 2008, and May 2, 2008.

V. FACILITY INFORMATION:

A. Location - 7807 River Road, Jarreau, Pointe Coupee Parish

B. Applicant Activity -

Louisiana Generating LLC (LaGen), Big Cajun I Power Plant is an existing steam electric generating plant with a 470 MW capacity. The plant currently consists of two natural gas-fired steam units (Units 1 & 2) and two gas-fired turbines (Units 3 & 4). LaGen is proposing to dismantle the existing gas-fired boiler units 1 and 2 and replace them with a new circulating fluidized bed (CFB) unit capable of producing 230 MW of electricity. The CFB unit will operate by combustion of solid fuels (either petroleum coke, coal, or biomass) and will consist of one CFB boiler, two steam turbines, and two generators. The repowering will result in construction of an on-site ash management landfill and retention pond and solid fuel handling equipment consisting of but not limited to a dock, unloader, transport conveyor, and fuel storage piles. The natural gas-fired turbines that were installed in 2001 will remain in service and will not be affected by the repowering. The project is expected to be completed during this permit cycle. At this time, there is no specified time schedule for the completion of phase II. The draft LPDES permit has been written to include Phase II operations.

Big Cajun I operates cooling towers and cooling water is withdrawn from on-site wells. This facility is not regulated by the 316(b) Phase II regulations.

C. Technology Basis - LAC 33:IX.4903

<u>Guideline</u>	<u>Reference</u>
Steam Electric Power Generating Point Source Category	40 CFR 423

Other sources of technology based limits:

LPDES permit LAG530000, Class I Sanitary General Permit Effective 12/1/2007

Best Professional Judgement

D. Fee Rate -

1. Fee Rating Facility Type: Major
2. Complexity Type: IV
3. Wastewater Type: III
4. SIC code: 4911

E. Estimated Facility Effluent Flow (Max 30-Day) – 1.25 MGD

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VI. RECEIVING WATERS:

Mississippi River, Subsegment 070201

- A. TSS (15%), mg/L: 53.3
- B. Average Hardness, mg/L CaCO_3 : 153.7
- C. Critical Flow, cfs: 141,955
- D. Mixing Zone Fraction: 1/3
- E. Harmonic Mean Flow, cfs: 366,748
- F. River Basin: Mississippi River, Segment No. 070201
- G. Designated Uses:

The designated uses of Subsegment 070201 (Outfalls 001, 003, 004) are primary contact recreation, secondary contact recreation, fish and wildlife propagation, and drinking water.

The designated uses of Subsegment 120108 (Outfall 002) are primary contact recreation, secondary contact recreation, and fish and wildlife propagation.

Stream data information in A – E for Subsegment 070201, based on the following: LAC 33:IX Chapter 11; Recommendation(s) from the Engineering Section. Hardness and 15% TSS data come from monitoring station #318 on the Mississippi River on the LA 10 ferry landing in St. Francisville, LA.

VII. OUTFALL INFORMATION:

PHASE I

Outfall 001

- A. Type of wastewater - cooling tower blowdown, Unit 3 and Unit 4 fuel gas separator HVAC blowdown and turbine washwater (intermittent), and previously monitored effluent
- B. Location - at the point of discharge from the lift station where the cooling tower blowdown and previously monitored effluent are pumped to the Mississippi River, prior to combining with any other waters (Latitude 30° 40' 19", Longitude 91° 21' 15"), 260.6 M.A.H.P.
- C. Treatment – none at final outfall. Treatment does occur at internal outfalls.
- D. Flow – continuous – 1.25 MGD
- E. Receiving waters – Mississippi River
- F. Basin and segment - Mississippi River Basin, Segment 070201

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Internal Outfall 101

- A. Type of wastewater – low volume wastewater from Unit 1
- B. Location - at the point of discharge from the boiler blowdown line prior to mixing with any other waters (Latitude 30°40'21", Longitude 91°21'18")
- C. Treatment - none
- D. Flow – 0.0024 MGD
- E. Receiving waters – Mississippi River via Outfall 001
- F. Basin and segment - Mississippi River Basin, Segment 070201

Internal Outfall 201

- A. Type of wastewater – low volume wastewater from Unit 2
- B. Location - at the point of discharge from the boiler blowdown line prior to mixing with any other waters (Latitude 30°40'21", Longitude 91°21'18")
- C. Treatment - none
- D. Flow – 0.0024 MGD
- E. Receiving waters – Mississippi River via Outfall 001
- F. Basin and segment – Mississippi River Basin, Segment 070201

Internal Outfall 301

- A. Type of wastewater – chemical metal cleaning wastewater and preheater washdown from Unit 1
- B. Location - at the point of discharge prior to mixing with any other waters (Latitude 30°40'20", Longitude 91°21'18")
- C. Treatment – pH adjustment, settling, precipitation
- D. Flow – 0.0005 MGD
- E. Receiving waters – Mississippi River via Outfall 001
- F. Basin and segment - Mississippi River Basin, Segment 070201

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Internal Outfall 401

- A. Type of wastewater – chemical metal cleaning wastewater and preheater washdown from Unit 2
- B. Location - at the point of discharge prior to mixing with any other waters (Latitude 30°40'20", Longitude 91°21'18")
- C. Treatment – pH adjustment, settling, precipitation
- D. Flow - 0.0005 MGD
- E. Receiving waters - Mississippi River via Outfall 001
- F. Basin and segment - Mississippi River Basin, Segment 070201

Internal Outfall 501

- A. Type of wastewater – low volume wastewater consisting of effluent from SPCC Oil Catch Basin
- B. Location - at the point of discharge from the catch basin prior to mixing with any other waters (Latitude 30°40'16", Longitude 91°21'21")
- C. Treatment – oil/water separator
- D. Flow – 0.02 MGD
- E. Receiving waters – Mississippi River via Outfall 001
- F. Basin and segment - Mississippi River Basin, Segment 070201

Outfall 002

- A. Type of wastewater – sanitary wastewater
- B. Location - at the point of discharge from the activated sludge treatment system, prior to mixing with any other waters (Latitude 30°40'14", Longitude 91°21'27")
- C. Treatment – activated sludge, mixing, chemical oxidation, chemical precipitation, coagulation, multimedia filtration, gravity thickening, chemical conditioning, and vacuum filtration
- D. Flow – 0.0288MGD
- E. Receiving waters – False River via local drainage
- F. Basin and segment - Terrebonne Basin, Segment 120108

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PHASE II

Outfall 001

No changes. See Phase I description above.

Internal Outfall 101

- A. Type of wastewater - low volume wastewater from the CFB Unit
- B. Location - at the point of discharge from the boiler blowdown line from the CFB Unit prior to mixing with any other waters (Latitude 30°40'21", Longitude 91°21'18")
- C. Treatment - none
- D. Flow – 0.0167 MGD
- E. Receiving waters – Mississippi River via Outfall 001
- F. Basin and segment - Mississippi River Basin, Segment 070201

Internal Outfall 201

- A. Type of wastewater – preheater washdown and intermittent discharge of chemical metal cleaning wastewater from the CFB unit.
- B. Location - at the point of discharge prior to mixing with any other waters (Latitude 30°40'21", Longitude 91°21'18")
- C. Treatment - none
- D. Flow – intermittent
- E. Receiving waters – Mississippi River via Outfall 001
- F. Basin and segment - Mississippi River Basin, Segment 070201

Internal Outfall 301

- A. Type of wastewater – stormwater/leachate from the ash pile storage area
- B. Location - at the point of discharge from ash pile retention pond, prior to mixing with any other waters.
- C. Treatment – retention pond
- D. Flow – intermittent

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- E. Receiving waters - Mississippi River via Outfall 001
- F. Basin and segment - Mississippi River Basin, Segment 070201

Internal Outfall 401

This outfall is deleted in Phase II. Unit 2 will be removed from the facility with the installation of the new CFB unit.

Internal Outfall 501

There are no changes to Outfall 501. See Phase I description above.

Outfall 002

There are no changes to Outfall 002. See Phase I description above.

Outfall 003

- A. Type of wastewater – rainwater from dewatering of dry commodity hopper barges transporting limestone
- B. Location - at the point of discharge from the barge being dewatered (Latitude 30°40'27", Longitude 91°20'51")
- C. Treatment – none
- D. Flow – intermittent
- E. Receiving waters – Mississippi River
- F. Basin and segment – Mississippi River Basin, Segment 070201

Outfall 004

- A. Type of wastewater – rainwater from the dewatering of coal and coke hopper barges
- B. Location - at the point of discharge from the barge being dewatered (Latitude 30°40'27", Longitude 91°20'51")
- C. Treatment – none
- D. Flow – intermittent
- E. Receiving waters – Mississippi River
- F. Basin and segment – Mississippi River Basin, Segment 070201

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VIII. PREVIOUS EFFLUENT LIMITATIONS

Outfall 001 – cooling tower blowdown, turbine washwater from Units 3 & 4, fuel gas separator HVAC blowdown from Units 3 & 4, and previously monitored effluent

Parameter	LPDES PERMIT LIMITATIONS			
	Monthly Average (lb/d)	Daily Maximum (lb/d)	Monthly Average (mg/l)	Daily Maximum (mg/l)
Flow - mgd	Report Continuous	Report Continuous	---	---
Temperature	103 °F Continuous	108 °F Continuous	---	---
Free Available Chlorine	0.33 1/week	0.82 1/week	0.2 1/week	0.5 1/week
Total Chromium	3.96 1/year	3.96 1/year	0.2 1/year	0.2 1/year
Total Zinc	19.78 1/week	19.78 1/week	1.0 1/week	1.0 1/week
Total Copper	---	---	1.0 1/week	1.0 1/week
Total Iron	---	---	1.0 1/week	1.0 1/week
pH	6 - 9 s.u. 1/week			

Whole Effluent (Acute) Toxicity Testing	Monthly Avg Minimum	48-Hour Minimum	Measurement Frequency
NOEC, Pass/Fail (0/1), 24-hr composite lethality, Static Renewal. 48 hour Acute <u>Pimephales promelas</u>	Report	Report	1/year
NOEC, Value (%), 24-hr composite lethality, Static Renewal. 48 hour Acute <u>Pimephales promelas</u>	Report	Report	1/year
NOEC, Value (%), 24-hr composite Coefficient of Variation, Static Renewal. 48 hour Acute <u>Pimephales promelas</u>	Report	Report	1/year
NOEC, Pass/Fail (0/1), 24-hr composite lethality, Static Renewal. 48 hour Acute <u>Daphnia pulex</u>	Report	Report	1/year
NOEC, Value (%), 24-hr composite lethality, Static Renewal. 48 hour Acute <u>Daphnia pulex</u>	Report	Report	1/year
NOEC, Value (%), 24-hr composite Coefficient of Variation, Static Renewal. 48 hour Acute <u>Daphnia pulex</u>	Report	Report	1/year

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Outfall 101 – low volume wastewater consisting of boiler blowdown from Unit 1
Outfall 201 – low volume wastewater consisting of boiler blowdown from Unit 2
Outfall 501 – low volume wastewater consisting of oil spill catch basin effluent

Parameter	LPDES PERMIT LIMITATIONS			
	Monthly Average (lb/d)	Daily Maximum (lb/d)	Monthly Average (mg/l)	Daily Maximum (mg/l)
Flow - mgd	Report 1/day	Report 1/day	---	---
TSS	---	---	30 1/week	100 1/week
Oil & Grease	---	---	15 1/week	20 1/week

Outfall 301 – chemical metal cleaning wastewater and preheater washdown from Unit 1
Outfall 401 – chemical metal cleaning wastewater and preheater washdown from Unit 2

Parameter	LPDES PERMIT LIMITATIONS			
	Monthly Average (lb/d)	Weekly Average (lb/d)	Monthly Average (mg/l)	Weekly Average (lb/d)
Flow – mgd	Report 1/day	Report 1/day	---	---
TSS	---	---	30 1/week	100 1/week
Oil & Grease	---	---	15 1/week	20 1/week
Total Copper	---	---	1.0 1/week	1.0 1/week
Total Iron	---	---	1.0 1/week	1.0 1/week

Outfall 002 – treated sanitary wastewater

Parameter	LPDES PERMIT LIMITATIONS			
	Monthly Average (lb/d)	Weekly Average (lb/d)	Monthly Average (mg/l)	Weekly Average (mg/l)
Flow - mgd	---	---	---	Report 1/6 months
BOD ₅	---	---	---	45 1/6 months
TSS	---	---	---	45 1/6 months
Fecal Coliform Colonies/100 ml	---	---	---	400 1/6 months
pH	6.0 (min)	9.0 (max)	---	1/6 mos

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IX. PROPOSED PERMIT LIMITS:

The specific effluent limitations and/or conditions will be found in the draft permit. Development and calculation of permit limits are detailed in the Permit Limit Rationale section below.

The following section sets forth the principal facts and the significant factual, legal, methodological, and policy questions considered in preparing the draft permit. Also set forth are any calculations or other explanations of the derivation of specific effluent limitations and conditions, including a citation to the applicable effluent limitation guideline or performance standard provisions as required under LAC 33:IX.2707/40 CFR Part 122.44 and reasons why they are applicable or an explanation of how the alternate effluent limitations were developed.

A. CHANGES FROM PREVIOUS PERMIT

- a. Mass limits for Total Chromium and Total Zinc at Outfall 001 have been recalculated based on the 1.25 MGD flow submitted in the application and the addendum submitted on February 26, 2008.
- b. The facility requested a frequency monitoring reduction at Outfall 001 for FAC and Total Zinc in accordance with the April, 1996 Interim Guidance for Performance-Based Reduction of NPDES Permit Monitoring Frequencies. The monitoring frequencies of these parameters have been reduced to 1/month for Phase I of the permit. The frequencies will return to 1/week in Phase II of the permit.
- c. In Phase II of the permit, the description of Outfall 101 is changed to reflect the repowering of the plant.
- d. In Phase II of the permit, the discharge from Outfall 201 is changed from low volume wastewater to preheater washdown and chemical metal cleaning wastewater. Interim limits will address the Phase I activity. Final limits will address the Phase II activity.
- e. In Phase II, the discharge from Outfall 301 is changed from preheater washdown and chemical metal cleaning water to stormwater and leachate from the ash landfill. Interim limits will address the Phase I activity. Final limits will address the Phase II activity.
- f. In Phase II of the permit, Outfall 401 will be removed.
- g. In Phase II of the permit, Outfalls 003 and 004 have been added to address limestone barge dewatering activities and coal and coke barge dewatering (rainwater) activities at the proposed barge dock.
- h. Part II language has been added to address dewatering (rainwater) of barges.
- i. In Phase II of the permit, Temperature limits on Outfall 001 have been increased.

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B. TECHNOLOGY-BASED VERSUS WATER QUALITY STANDARDS-BASED EFFLUENT LIMITATIONS AND CONDITIONS

Following regulations promulgated at LAC 33:IX.2707.L.2.b, the draft permit limits are based on either technology-based effluent limits pursuant to LAC 33:IX.2707.A or on State water quality standards and requirements pursuant to LAC 33:IX.2707.D, whichever are more stringent.

1. TECHNOLOGY-BASED EFFLUENT LIMITATIONS AND CONDITIONS

Regulations promulgated at LAC 33:IX.2707.A require technology-based effluent limitations to be placed in LPDES permits based on effluent limitations guidelines where applicable, on BPL (best professional judgement) in the absence of guidelines, or on a combination of the two. The following is a rationale for types of wastewaters. The permittee is subject to (Phase I) Best Practicable Control Technology Currently Available (BPT), Best Available Technology Economically Achievable (BAT), and (Phase II) New Source Performance Standards (NSPS) of the effluent limitation guidelines listed below:

<u>Manufacturing Operation</u>	<u>Guideline</u>
Steam Electric Power Generating Point Source Category	40 CFR 423

Regulations require permits to establish monitoring requirements to yield data representative of the monitored activity [LAC 33:IX.2715] and to assure compliance with permit limitations [LAC 33:IX.2707.I].

2. WATER QUALITY BASED EFFLUENT LIMITATIONS

Technology-based effluent limitations were screened against state water quality numerical standard based limits by following guidance procedures established in the Permitting Guidance Document for Implementing Louisiana Surface Water Quality Standards. Calculations, results, and documentation are presented in Appendix B.

The following pollutants received water quality based effluent limits:

none

C. MONITORING FREQUENCIES

Regulations require permits to establish monitoring requirements to yield data representative of the monitored activity (LAC33:IX.2715) and to assure compliance with permit limitations (LAC33:IX.2707.I). Specific monitoring frequencies per outfall are listed in Section D.

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D. OUTFALL SPECIFIC RATIONALES

Outfall 001

1. General Comments

The discharge of cooling tower blowdown, Unit 3 and Unit 4 fuel gas separator HVAC blowdown and turbine washwater, and previously monitored effluent [Interim Limits beginning on the permit effective date until the commencement of Phase II operations or the expiration date of the permit (whichever comes first)].

2. Effluent Limitations, Monitoring Frequencies, and Sample Types

EFFLUENT CHARACTERISTIC	LIMITATION		MONITORING REQUIREMENTS	
	Monthly Avg	Daily Max	Measurement Frequency	Sample Type
Flow-mgd	Report	Report	continuous	recorder
Temperature (° F)	103	108	continuous	recorder
FAC	0.2 mg/l	0.5 mg/l	1/month	Grab*
FAC	0.33 lbs/d	0.82 lbs/d	1/month	Grab*
Total Chromium	0.2 mg/l	0.2 mg/l	1/year	Grab
Total Chromium	2.08 lbs/d	2.08 lbs/d	1/year	Grab
Total Zinc	1.0 mg/l	1.0 mg/l	1/month	Grab
Total Zinc	10.43 lbs/d	10.43 lbs/d	1/month	Grab
Total Copper	1.0 mg/l	1.0 mg/l	1/week	Grab**
Total Iron	1.0 mg/l	1.0 mg/l	1/week	Grab**
pH (su)	6.0 (min)	9.0 (max)	1/week	Grab

* Sample shall be representative of any periodic episodes of chlorination, biocide usage, or other potentially toxic substance discharged on an intermittent basis.

** During discharge of turbine washwater, sampling is required.

3. General Comments

The discharge of cooling tower blowdown, Unit 3 and Unit 4 fuel gas separator HVAC blowdown and turbine washwater, and previously monitored effluent [Final Limits beginning on the commencement of Phase II operations until the expiration date of the permit].

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4. Effluent Limitations, Monitoring Frequencies, and Sample Types

EFFLUENT CHARACTERISTIC	LIMITATION		MONITORING REQUIREMENTS	
	Monthly Avg	Daily Max	Measurement Frequency	Sample Type
Flow-mgd	Report	Report	continuous	recorder
Temperature (° F)	106	111	continuous	recorder
FAC	0.2 mg/l	0.5 mg/l	1/week	Grab*
FAC	0.33 lbs/d	0.82 lbs/d	1/week	Grab*
Total Chromium	0.2 mg/l	0.2 mg/l	1/year	Grab
Total Chromium	2.08 lbs/d	2.08 lbs/d	1/year	Grab
Total Zinc	1.0 mg/l	1.0 mg/l	1/week	Grab
Total Zinc	10.43 lbs/d	10.43 lbs/d	1/week	Grab
Total Copper	1.0 mg/l	1.0 mg/l	1/week	Grab**
Total Iron	1.0 mg/l	1.0 mg/l	1/week	Grab**
pH (su)	6.0 (min)	9.0 (max)	1/week	Grab

* Sample shall be representative of any periodic episodes of chlorination, biocide useage, or other potentially toxic substance discharged on an intermittent basis.

** During discharge of turbine washwater, sampling is required.

Flow – The monthly average and daily maximum flow limitations, monitoring frequency and sample type are retained from the current LPDES permit. This requirement is consistent with LAC 33:IX.2707.1.1.b/40 CFR 122.44(l)(1)(ii).

Temperature – The current LPDES permit established a monthly average temperature limit of 103°F and a daily maximum limit of 108°F. These limits are retained in Phase I.

The permittee has expressed concern that these temperature limits would require scaled back production during the summer months (when electricity demand is high) once the CFB boiler is installed in Phase II. Louisiana Water Quality Standards for temperature in fresh water are found in LAC 33:IX.1113.C.4.b.i. For rivers and streams, the maximum temperature rise allowed after mixing is 5°F above the naturally occurring ambient temperature of the receiving waterbody not to exceed 90°F except where otherwise listed for specific waterbodies. LAC 33:IX.1115.C.7 specifies the mixing zone for streams with 7Q10 flow greater than 100 cfs as either 100 cfs or 1/3 of the flow, whichever is greater. The critical flow (7Q10) of the Mississippi River is 141,955 cfs. Therefore, the mixing zone for the receiving waterbody at Outfall 001 is 47,318 cfs. Appendix D demonstrates that a monthly average temperature limitation of 106 °F and a daily maximum temperature limitation of 111 °F would be in compliance with LAC33:IX.1113.C.4.b.i. The mixing zone calculations use a flow of 2.5 MGD to account for a potential increase in flow from Outfall 001 upon start up of the CFB boiler. At this time, Big Cajun I does not have a more exact engineering estimate of potential flow changes resulting from the addition of the CFB. The monitoring frequency and sample type are retained from the previous permit.

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Free Available Chlorine (FAC) - The current LPDES permit established a monthly average of 0.2 mg/l and a daily maximum of 0.5 mg/l in accordance with 40 CFR 423.13(d)(1), (2), and (g). These concentration limits are retained in the draft permit. In accordance with 40 CFR 122.45(f), mass limitations are applied. Mass loadings for Free Available Chlorine in the previous permit were not based on the conventional concentration to loading calculation (i.e. mg/l X MGD X 8.34). Using this calculation would produce limitations significantly higher than the limitations established in the previous permit. Since the permittee is consistently meeting the previous permit's more stringent mass limitations, in accordance with LAC 33:IX.2707.1..., the basis for calculating the mass limitations for free available chlorine has not changed. Therefore, the mass limitations in the current LPDES permit have been retained in this permit.

The facility has requested a monitoring frequency reduction for this parameter. The monitoring frequency has been reduced to 1/month in Phase I of this draft permit based upon the April, 1996, Interim Guidance for Performance-Based Reduction of NPDES Permit Monitoring Frequencies, because the permittee has demonstrated an ability to consistently reduce pollutants in the discharge below the levels necessary to meet existing permit requirements for this outfall. Two years of data were reviewed and the composite average of this data was compared to the permit limit to determine the potential monitoring frequency reduction. These reductions establish monitoring that is more frequent than the reductions allowed by the performance-based guidance mentioned above. However, as indicated in the guidance, this Office may elect to maintain higher monitoring frequency levels where there may be a particular interest in human health, endangered species, or sensitive aquatic environment. This Office reserves the right to impose more stringent requirements than those outlined in the performance-based guidance.

The frequency shall revert to 1/week in Phase II of the draft permit. The facility is repowering and proposing to add ash landfill stormwater and leachate to Outfall 001. Therefore, this Office is requiring more frequent monitoring to demonstrate compliance with the permit limits. The permittee may request further reductions at a later date.

Total Chromium - The current LPDES permit established monthly average of 0.2 mg/l and a daily maximum of 0.2 mg/l in accordance with 40 CFR 423.13(d)(1). Monthly average and daily maximum mass limitations of 3.96 lb/d respectively were also established per 40 CRR 122.45(f)/LAC 33:IX.2709.F based on a flow of 2.3714 MGD. Both the permit application and addendum to the application state that the 30-day maximum flow is 1.25 MGD. The mass limits have been recalculated based on this flow and monthly average/daily maximum limits of 2.08 lbs/d are established in the draft permit. Monitoring frequency and sample type are retained from the current permit.

Total Zinc - The current LPDES permit established monthly average of 1.0 mg/l and a daily maximum of 1.0 mg/l in accordance with 40 CFR 423.13(d)(1). Monthly average and daily maximum mass limitations of 19.78 lb/d respectively were also established per 40 CRR 122.45(f)/LAC 33:IX.2709.F based on a flow of 2.3714 MGD. Both the permit application and addendum to the application state that the 30-day maximum flow is 1.25 MGD. The mass limits have been recalculated based on this flow and monthly average/daily maximum limits of 10.43 lbs/d are established in the draft permit.

The facility has requested a monitoring frequency reduction for this parameter. The monitoring frequency has been reduced to 1/month in Phase I of this draft permit based upon the April, 1996, Interim Guidance for Performance-Based Reduction of NPDES Permit Monitoring Frequencies, because the

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permittee has demonstrated an ability to consistently reduce pollutants in the discharge below the levels necessary to meet existing permit requirements for this outfall. Two years of data were reviewed and the composite average of this data was compared to the permit limit to determine the potential monitoring frequency reduction. These reductions establish monitoring that is more frequent than the reductions allowed by the performance-based guidance mentioned above. However, as indicated in the guidance, this Office may elect to maintain higher monitoring frequency levels where there may be a particular interest in human health, endangered species, or sensitive aquatic environment. This Office reserves the right to impose more stringent requirements than those outlined in the performance-based guidance.

The frequency shall revert to 1/week in Phase II of the draft permit. The facility is repowering and proposing to add ash landfill stormwater and leachate to Outfall 001. Therefore, this Office is requiring more frequent monitoring to demonstrate compliance with the permit limits. The permittee may request further reductions at a later date.

Total Copper and Total Iron – The total copper and total iron limitations are retained from the current LPDES permit. These limits are based on 40 CFR 423.13(e) and (g). Monitoring frequency and sample type are also retained from the previous permit. Sampling is required only during times of discharge of turbine washwater. Since the activity is intermittent, only concentration limits are established as allowed by 40 CFR 423.13(g).

pH – The pH limitations are retained from the current LPDES permit. These limits are based on 40 CFR 423.12(b)(1) in Phase I and 423.15(a) in Phase II. Monitoring frequency and sample type are retained from the current permit.

Biomonitoring Requirements - It has been determined that there may be pollutants present in the effluent which may have the potential to cause toxic conditions in the receiving stream. The State of Louisiana has established a narrative criteria which states, "toxic substances shall not be present in quantities that alone or in combination will be toxic to plant or animal life." The Office of Environmental Services requires the use of the most recent EPA biomonitoring protocols.

Whole effluent biomonitoring is the most direct measure of potential toxicity which incorporates both the effects of synergism of effluent components and receiving stream water quality characteristics. Biomonitoring of the effluent is, therefore, required as a condition of this permit to assess potential toxicity. The biomonitoring procedures stipulated as a condition of this permit for Outfall 001 are as follows:

TOXICITY TESTS

Acute static renewal 48-hour
 definitive toxicity test using
 fathead minnow (*Pimephales promelas*)

FREQUENCY

once per year

Acute static renewal 48-hour
 definitive toxicity test using
Daphnia pulex

once per year

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Toxicity tests shall be performed in accordance with protocols described in the latest revision of the "Methods for Measuring the Acute Toxicity of Effluents and Receiving Waters to Freshwater and Marine Organisms." The stipulated test species are appropriate to measure the toxicity of the effluent consistent with the requirements of the State water quality standards. The biomonitoring frequency has been established to reflect the likelihood of ambient toxicity and to provide data representative of the toxic potential of the facility's discharge in accordance with regulations promulgated at LAC 33:IX.2715.

Results of all dilutions as well as the associated chemical monitoring of pH, temperature, hardness, dissolved oxygen, conductivity, and salinity shall be documented in a full report according to the test method publication mentioned in the previous paragraph. The permittee shall submit a copy of the first full report to the Office of Environmental Compliance. However, the full report and subsequent reports are to be retained for three (3) years following the provisions of Part III.C.3 of this permit. The permit requires the submission of certain toxicity testing information as an attachment to the Discharge Monitoring Report.

This permit may be reopened to require effluent limits, additional testing, and/or other appropriate actions to address toxicity if biomonitoring data shows actual or potential ambient toxicity to be the result of the permittee's discharge to the receiving stream or water body. Modification or revocation of the permit is subject to the provisions of LAC 33:IX.3105. Accelerated or intensified toxicity testing may be required in accordance with Section 308 of the Clean Water Act.

Dilution Series - The permit requires five (5) dilutions in addition to the control (0% effluent) to be used in the toxicity tests. These additional effluent concentrations shall be 0.017%, 0.023%, 0.031%, 0.041%, and 0.054%. The biomonitoring critical dilution is defined as 0.041% effluent.

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Outfall 002

1. General Comments

The discharge of treated sanitary wastewater (estimated flow 0.0021 MGD).

2. Effluent Limitations, Monitoring Frequencies, and Sample Types

The effluent limitations and monitoring frequencies proposed for Outfall 002 are transferred from the general permit, LAG530000 to this draft LPDES permit. The limits and monitoring frequencies are retained from the previous LPDES permit. The effluent limitations, monitoring frequencies, and sample types proposed for Outfall 002 in the draft LPDES Permit are as follows:

EFFLUENT CHARACTERISTIC	LIMITATION		MONITORING REQUIREMENTS	
	Monthly Avg	Weekly Avg	Measurement Frequency	Sample Type
Flow-mgd	---	Report	1/6 months	Estimate
BOD ₅	---	45 mg/l	1/6 months	Grab
TSS	---	45 mg/l	1/6 months	Grab
Fecal Coliform # colonies/100 ml	---	400	1/6 months	Grab
pH	6.0 s.u. (min)	9.0 s.u. (max)	1/6 months	Grab

Outfall 003

1. General Comments

The discharge of rainwater from dry commodity hopper barges transporting limestone (estimated flow is intermittent).

2. Effluent Limitations, Monitoring Frequencies, and Sample Types

The effluent limitations and monitoring frequencies proposed for Outfall 003 are based on LDEQ standard language and requirements for the discharge of rainwater in barges/vessels as found in permits for barge/vessel cleaning facilities.

Based on BPJ and on permits for similar facilities, no effluent limitations are established for rainwater from uncleaned barges previously containing dry commodities including: limestone. Best Management Practices (BMPs) for barge operations are listed in Part II.

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Outfall 004

1. General Comments

The discharge of rainwater from coal and coke hopper barges (estimated flow is intermittent).

2. Effluent Limitations, Monitoring Frequencies, and Sample Types

The effluent limitations and monitoring frequencies proposed for Outfall 004 are based on LDEQ standard language and requirements for the discharge of rainwater in barges/vessels as found in permits for barge/vessel cleaning facilities.

EFFLUENT CHARACTERISTIC	LIMITATION		MONITORING REQUIREMENTS	
	Monthly Avg	Daily Max	Measurement Frequency	Sample Type
Flow-mgd	Report	Report	1/week	Estimate
COD	250 mg/l	400 mg/l	1/week	Grab
TSS – mg/l	Report	Report	1/month	Grab
pH - su	6.0 (min)	9.0 (max)	1/week	Grab

Internal Outfalls

In accordance with LAC 33:IX.3305, the following is an explanation for the establishment of Internal Outfalls 101, 201, 301, 401, and 501. Certain permit effluent limitations at the point of discharge are impractical because at the final discharge points the wastewater is diluted as to make monitoring impracticable. Therefore, in accordance with LAC 33:IX.2709, the internal outfalls described below will either remain or be included in the permit.

Outfall 101

1. General Comments Interim and Final Permit Limits

- a. The discharge of low volume wastewater from Unit 1. [Interim Limits beginning on the permit effective date until the commencement of Phase II operations or the expiration date of the permit (whichever comes first).]
- b. The discharge of low volume wastewater from the CFB Unit. [Final Limits beginning on the commencement of Phase II operations to the expiration date of the permit.]

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2. Effluent Limitations and Monitoring Frequencies

EFFLUENT CHARACTERISTIC	LIMITATION		MONITORING REQUIREMENTS	
	Monthly Avg	Weekly Avg	Measurement Frequency	Sample Type
Flow-mgd	Report	Report	1/day	Estimate
TSS	30 mg/l	100 mg/L	1/week	Grab
Oil & Grease	15 mg/l	20 mg/l	1/week	Grab

Flow – The monthly average and daily maximum flow reporting requirements are retained from the current LPDES permit. The monitoring frequency and sample type are also retained. This requirement is consistent with LAC 33:IX.2707.1.1.b.

Total Suspended Solids (TSS) - The current LPDES permit established a monthly average discharge limitation for TSS at 30 mg/l and a daily maximum discharge limitation at 100 mg/l which are retained in the draft permit. These limitations are based on 40 CFR 423.12(b)(3) and 40 CFR 423.15(c). BPT and NSPS requirements are the same in this regulation, therefore no changes are required for projected Phase II activities. The monitoring frequency and sample type are also retained from the current permit.

Oil & Grease - The current LPDES permit established a monthly average limitation of 15 mg/L and a daily maximum discharge limitation of 20 mg/l based on 40 CFR 423.12(b)(3) and 40 CFR 423.15(c). BPT and NSPS requirements are the same in this regulation, therefore no changes are required for projected Phase II activities. These limitations are retained. The monitoring frequency and sample type are also retained.

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Outfall 201

1. General Comments Interim Permit Limits

The discharge of low volume wastewater from Unit 2 [Interim Limits beginning on the permit effective date until the commencement of Phase II operations or the expiration date of the permit (whichever comes first)].

2. Effluent Limitations and Monitoring Frequencies

EFFLUENT CHARACTERISTIC	LIMITATION		MONITORING REQUIREMENTS	
	Monthly Avg	Weekly Avg	Measurement Frequency	Sample Type
Flow-mgd	Report	Report	1/day	Estimate
TSS	30 mg/l	100 mg/L	1/week	Grab
Oil & Grease	15 mg/l	20 mg/l	1/week	Grab

Flow – The monthly average and daily maximum flow reporting requirements are retained from the current LPDES permit. This requirement is consistent with LAC 33:IX.2707.1.1.b. The monitoring frequency and sample type are also retained from the current permit.

Total Suspended Solids (TSS) - The current LPDES permit established a monthly average discharge limitation for TSS at 30 mg/l and a daily maximum discharge limitation at 100 mg/l. These limitations are based on 40 CFR 423.12(b)(3). These limits are retained in the draft permit. The monitoring frequency and sample type are also retained from the current permit.

Oil & Grease - The current LPDES permit established a monthly average limitation of 15 mg/L and a daily maximum discharge limitation of 20 mg/l based on 40 CFR 423.12(b)(3). These limitations are retained. The monitoring frequency and sample type are also retained from the current permit.

3. General Comments Final Permit Limits

The discharge of preheater washdown and intermittent discharge of chemical metal cleaning wastewater from the CFB unit. [Final Limits beginning on the commencement of Phase II operations until the expiration date of the permit].

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4. Effluent Limitations and Monitoring Frequencies

EFFLUENT CHARACTERISTIC	LIMITATION		MONITORING REQUIREMENTS	
	Monthly Avg	Daily Max	Measurement Frequency	Sample Type
Flow-mgd	Report	Report	1/day	Estimate
TSS	30 mg/l	100 mg/l	1/week	Grab
Oil & Grease	15 mg/l	20 mg/l	1/week	Grab
Total Copper	1.0 mg/l	1.0 mg/l	1/week	Grab
Total Iron	1.0 mg/l	1.0 mg/l	1/week	Grab

Flow – The monthly average and daily maximum flow limitations are retained from the current LPDES permit. The requirement is consistent with LAC 33:IX.2707.1.1.1.b. The monitoring frequency is once per day by estimate using best engineering judgement when discharging. The monitoring frequency and sample type are based on requirements for similar discharges in the current LPDES permit.

Total Suspended Solids (TSS) – These limits are based on 40 CFR 423.15(c) and 40 CFR 423.15(d) (NSPS). The monitoring frequency is set at once per week by grab sample based on requirements for similar discharges in the current LPDES permit.

Oil and Grease - These limits are based on 40 CFR 423.15(c) and 40 CFR 423.15(d) (NSPS). The monitoring frequency is set at once per week by grab sample based on requirements for similar discharges in the current LPDES permit.

Total Copper - These limits are based on 40 CFR 423.15(d) and (m) (NSPS). The monitoring frequency is set at once per week by grab sample based on requirements for similar discharges in the current LPDES permit.

Total Iron - These limits are based on 40 CFR 423.15(d) and (m) (NSPS). The monitoring frequency is set at once per week by grab sample based on requirements for similar discharges in the current LPDES permit.

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Outfall 301

1. General Comments Interim Permit Limits

The discharge of chemical metal cleaning wastewater and preheater washdown from Unit 1 [Interim Limits beginning on the permit effective date until the commencement of Phase II operations or the expiration date of the permit (whichever comes first)].

2. Effluent Limitations and Monitoring Frequencies

EFFLUENT CHARACTERISTIC	LIMITATION		MONITORING REQUIREMENTS	
	Monthly Avg	Daily Max	Measurement Frequency	Sample Type
Flow-mgd	Report	Report	1/day	Estimate
TSS	30 mg/l	100 mg/l	1/week	Grab
Oil & Grease	15 mg/l	20 mg/l	1/week	Grab
Total Copper	1.0 mg/l	1.0 mg/l	1/week	Grab
Total Iron	1.0 mg/l	1.0 mg/l	1/week	Grab

Flow – The monthly average and daily maximum flow limitations are retained from the current LPDES permit. This LPDES permit retains those limitations. The requirement is consistent with LAC 33:IX.2707.1.1.1.b. The monitoring frequency and sample type are retained from the current LPDES permit.

Total Suspended Solids (TSS) – The current LPDES permit established a daily maximum discharge limitation of 100 mg/L and monthly average limitation of 30 mg/l based on 40 CFR 423.12(b)(3) (BPT). These limitations are retained in the draft permit. The monitoring frequency and sample type are retained from the current LPDES permit.

Oil and Grease -The current LPDES permit established a daily maximum discharge limitation of 20 mg/L and monthly average limitation of 15 mg/l based on 40 CFR 423.12(b)(3) (BPT). These limitations are retained in the draft permit. The monitoring frequency and sample type are retained from the current LPDES permit.

Total Copper - The current LPDES permit established a daily maximum discharge limitation of 1.0 mg/L and monthly average limitation of 1.0 mg/l based on 40 CFR 423.13(e) and (g). These limitations are retained in the draft permit. The monitoring frequency and sample type are retained from the current LPDES permit.

Total Iron - The current LPDES permit established a daily maximum discharge limitation of 1.0 mg/L and monthly average limitation of 1.0 mg/l based on 40 CFR 423.13(e) and (g). These limitations are retained

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in the draft permit. The monitoring frequency and sample type are retained from the current LPDES permit.

3. General Comments Final Permit Limits

The discharge of stormwater/leachate from the ash pile storage area. [Final Limits beginning on the commencement of Phase II operations until the expiration date of the permit].

4. Effluent Limitations and Monitoring Frequencies

EFFLUENT CHARACTERISTIC	LIMITATION		MONITORING REQUIREMENTS	
	Monthly Avg	Weekly Avg	Measurement Frequency	Sample Type
Flow-mgd	Report	Report	1/day	Estimate
TSS	30 mg/l	100 mg/L	1/week	Grab
Oil & Grease	15 mg/l	20 mg/l	1/week	Grab
TOC	---	50 mg/l	1/week	Grab

Flow – The monthly average and daily maximum flow reporting requirements are based LAC 33:IX.2707.1.1.b. The measurement frequency and sample type shall be 1/day by estimate. This is consistent with the requirements of other low volume wastewater outfalls established in this permit.

Total Suspended Solids (TSS) – This draft permit will establish a monthly average discharge limitation for TSS at 30 mg/l and a daily maximum discharge limitation at 100 mg/l. These limitations are based on 40 CFR 423.12(b)(3). The measurement frequency and sample type shall be 1/week by grab sample. This is consistent with the requirements of other low volume wastewater outfalls established in this permit.

Oil & Grease – This draft permit will establish a monthly average limitation of 15 mg/L and a daily maximum discharge limitation of 20 mg/l based on 40 CFR 423.12(b)(3). The measurement frequency and sample type shall be 1/week by grab sample. This is consistent with the requirements of other low volume wastewater outfalls established in this permit.

TOC – This draft permit will establish a daily maximum limitations of 50 mg/l based on BPJ in accordance with LDEQ stormwater guidance, letter dated 6/17/87 from J. Dale Givens (LDEQ) to Myron Knudson (EPA Region 6) and the Louisiana Pollutant Discharge Elimination System MultiSector General Permit for Storm Water Discharges associated with Industrial Activity (LAR050000). Monitoring frequency and sample type shall be 1/week by grab sample.

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Outfall 401

1. General Comments Interim Permit Limits

The discharge of chemical metal cleaning wastewater and preheater washdown from Unit 2 [Interim Limits beginning on the permit effective date until the commencement of Phase II operations or the expiration date of the permit (whichever comes first)].

2. Effluent Limitations and Monitoring Frequencies

EFFLUENT CHARACTERISTIC	LIMITATION		MONITORING REQUIREMENTS	
	Monthly Avg	Daily Max	Measurement Frequency	Sample Type
Flow-mgd	Report	Report	1/day	Estimate
TSS	30 mg/l	100 mg/l	1/week	Grab
Oil & Grease	15 mg/l	20 mg/l	1/week	Grab
Total Copper	1.0 mg/l	1.0 mg/l	1/week	Grab
Total Iron	1.0 mg/l	1.0 mg/l	1/week	Grab

Flow – The monthly average and daily maximum flow limitations are retained from the current LPDES permit. The requirement is consistent with LAC 33:IX.2707.1.1.1.b. The monitoring frequency and sample type are retained from the current LPDES permit.

Total Suspended Solids (TSS) – The current LPDES permit established a daily maximum discharge limitation of 100 mg/L and monthly average limitation of 30 mg/l based on 40 CFR 423.12(b)(3). These limitations are retained in the draft permit. The monitoring frequency and sample type are also retained.

Oil and Grease -The current LPDES permit established a daily maximum discharge limitation of 20 mg/L and monthly average limitation of 15 mg/l based on 40 CFR 423.12(b)(3). These limitations are retained in the draft permit. The monitoring frequency and sample type are also retained from the current permit.

Total Copper - The current LPDES permit established a daily maximum discharge limitation of 1.0 mg/L and monthly average limitation of 1.0 mg/l based on 40 CFR 423.13(e) and (g). These limitations are retained in the draft permit. The monitoring frequency and sample type are also retained from the current permit.

Total Iron - The current LPDES permit established a daily maximum discharge limitation of 1.0 mg/L and monthly average limitation of 1.0 mg/l based on 40 CFR 423.13(e) and (g). These limitations are retained in the draft permit. The monitoring frequency and sample type are also retained from the current permit.

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3. General Comments Final Permit Limits

[Final Limits beginning on the commencement of Phase II operations until the expiration date of the permit].

This Outfall is deleted in Phase II.

Outfall 501

1. General Comments

The discharge of low volume wastewater consisting of effluent from SPCC Oil Catch Basin.

2. Effluent Limitations and Monitoring Frequencies

EFFLUENT CHARACTERISTIC	LIMITATION		MONITORING REQUIREMENTS	
	Monthly Avg	Weekly Avg	Measurement Frequency	Sample Type
Flow-mgd	Report	Report	1/day	Estimate
TSS	30 mg/l	100 mg/L	1/week	Grab
Oil & Grease	15 mg/l	20 mg/l	1/week	Grab

Flow – The monthly average and daily maximum flow reporting requirements are retained from the current LPDES permit. This requirement is consistent with LAC 33:IX.2707.1.1.b. The monitoring frequency and sample type are also retained from the current permit.

Total Suspended Solids (TSS) - The current LPDES permit established a monthly average discharge limitation for TSS at 30 mg/l and a daily maximum discharge limitation at 100 mg/l. These limitations are based on 40 CFR 423.12(b)(3). These limits are retained in the draft permit. The monitoring frequency and sample type are also retained from the current permit.

Oil & Grease - The current LPDES permit established a monthly average limitation of 15 mg/L and a daily maximum discharge limitation of 20 mg/l based on 40 CFR 423.12(b)(3). These limitations are retained. The monitoring frequency and sample type are also retained from the current permit.

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Part II Specific Conditions

PROHIBITION OF PCB DISCHARGES

As commanded by 40 CFR 423.12(b)(2), a Part II condition is proposed in this draft permit prohibiting the discharge of polychlorinated biphenyl compounds.

"There shall be no discharge of polychlorinated biphenyls (PCB's). The minimum quantification level for PCB's is 1.0 $\mu\text{g/l}$. If any individual analytical test result for PCB's is less than the minimum quantification level, then a value of zero (0) shall be used for the Discharge Monitoring Report (DMR) calculations and reporting requirements."

LOW VOLUME WASTE SOURCES

The term "low volume waste sources" means, taken collectively as if from one source, wastewater from all sources except those for which specific limitations are otherwise established. Low volume waste sources include, but are not limited to: wastewaters from wet scrubber air pollution control systems, ion exchange water treatment systems, water treatment evaporator blowdown, laboratory and sampling streams, boiler blowdown, floor drains, cooling tower basin cleaning wastes, and recirculating house service water systems. Sanitary and air conditioning wastewaters are not included.

FREE AVAILABLE CHLORINE

The term "free available chlorine" shall mean the value obtained using the amperometric titration method for free available chlorine described in the latest edition of Standard Methods for the Examination of Water and Wastewater.

Free available chlorine may not be discharged from any unit for more than two hours in any one day and not more than one unit in any plant may discharge free available chlorine at any one time.

TEMPERATURE

Daily temperature discharge is defined as the flow-weighted average (FWAT) and, on a daily basis, shall be monitored and recorded in accordance with Part I of this permit. FWAT shall be calculated at equal time intervals not greater than two hours. The method of calculating FWAT is as follows:

$$\text{FWAT} = \frac{\text{SUMMATION (INSTANTANEOUS FLOW X INSTANTANEOUS TEMPERATURE)}}{\text{SUMMATION (INSTANTANEOUS FLOW)}}$$

"Daily average temperature" (also known as average monthly or maximum 30 day value) shall be the arithmetic average of all FWATs calculated during the calendar month.

"Daily maximum temperature" (also known as the maximum daily value) shall be the highest FWAT calculated during the calendar month.

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CHEMICAL METAL CLEANING WASTES

The term *chemical metal cleaning waste* means any wastewater resulting from cleaning of any metal process equipment with chemical compounds, including, but not limited to, boiler tube cleaning.

BARGE RAINWATER DISCHARGES

Discharge of rainwater from subject barges/vessels that have not been cleaned, must be discharged through the appropriate outfall and in accordance with the effluent limitations and conditions for the outfall for that type of barge/ vessel.

Rainwater or river water that has accumulated in cleaned open top customer barges/vessels and/or in the permittee's spar barges/vessels (excluding coal and coke*) may be discharged without sampling provided there is no visible oil sheen and no visible indication of any other contamination other than minor amounts of rust. If a sheen or visible indication of other contamination is present, a sample must be taken and tested for compliance with the following parameters prior to discharge:

TOC - 50 mg/L; Oil & Grease - 15 mg/L; and pH within the range of 6.0 - 9.0 standard units.

If a sample(s) has been taken and tested, monitoring results (summarized monthly) must be reported on a Discharge Monitoring Report (DMR) form (EPA No. 3320-1 or an approved substitute). DMR forms shall be submitted quarterly along with and in the same manner as DMR forms for outfalls.

* The discharge of rainwater or riverwater from barges/vessels that contained coal and/or coke is considered contaminated and must be discharged by way of the coal and coke barge/ vessel washwater outfall.

BEST MANAGEMENT PRACTICES FOR DOCK WASHDOWN

For facilities discharging wastewaters from dock washdown (with or without soaps and/or detergents), the following BMPs shall be implemented and shall be documented in a written plan which is maintained onsite at the facility (and provided to this Office upon request).

1. All washing shall be conducted without soaps and detergents or with biodegradable soaps used in minimal amounts. The use of non-biodegradable or emulsifying soaps and detergents, cleaners containing potentially hazardous chemicals, and solvents is prohibited.
2. If the washing activity takes place on an impermeable surface (such as concrete or asphalt paving), the area where the washing operation is to be conducted and the subsequent drainage path shall be swept clean of dirt and other dry substances immediately prior to commencing the washing operation.
3. Any spills, drips of fluids, or other contamination to the washing area and the subsequent drainage area shall be picked up by dry means prior to the beginning of the washing operation. The use of detergents, emulsifiers, or dispersants to clean up spilled contaminants is prohibited except where necessary to comply with State and Federal safety regulations (e.g., requirement for non-slippery work surface). In all such cases, initial cleanup shall be done by physical removal and chemical usage shall be minimized.

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BILGE AND/OR SLOP WATERS:

The discharge of bilge and/or slops waters is not permitted.

BALLAST WATERS

The discharge of incoming, maintenance and/or dry dock ballast water is not permitted.

BEST MANAGEMENT PRACTICE (BMP) OR STATE OF THE ART FOR CLEANING DRY CARGO BARGES WITH THE COMMODITIES INCLUDING LIMESTONE.

1. There shall be no discharge of bulk solids.
2. Solids remaining on the barge after primary cleaning/product recovery methods such as front end loader, etc. must be removed for disposal as appropriate using vacuuming, sweeping or other acceptable methods.

PERMIT REOPENER CLAUSE

In accordance with LAC 33:IX.2903, this permit may be modified, or alternatively, revoked and reissued, to comply with any applicable effluent standard or limitations issued or approved under sections 301(b)(2)(c) and (D); 304(b)(2); and 307(a)(2) of the Clean Water Act, if the effluent standard or limitations so issued or approved:

1. Contains different conditions or is otherwise more stringent than any effluent limitation in the permit; or
2. Controls any pollutant not limited in the permit; or
3. Requires reassessment due to change in 303(d) status of waterbody; or
4. Incorporates the results of any total maximum daily load allocation, which may be approved for the receiving water body.

STORMWATER POLLUTION PREVENTION PLAN (SWPPP) REQUIREMENT

In accordance with LAC 33:IX.2707.1.3 and 4, a Part II condition is proposed for applicability to all stormwater discharges from the facility, either through permitted outfalls or through outfalls which are not listed in the permit or as sheet flow. The Part II condition requires a Storm Water Pollution Prevention Plan (SWP3) within six (6) months of the effective date of the final permit, along with other requirements. If the permittee maintains other plans that contain duplicative information, that plan could be incorporated by reference into the SWP3. Examples of these type plans include, but are not limited to: Spill Prevention Control and Countermeasure Plan (SPCC), Best Management Plan (BMP), Response Plans, etc. The conditions will be found in the draft permit. Including Best Management Practice (BMP) controls in the form of a SWP3 is consistent with other LPDES and EPA permits regulating similar discharges of storm water associated with industrial activity, as defined at LAC 33:IX.2511.B.14.

X. Compliance History/DMR Review:

A DMR review was completed for the period of January 1, 2005, through September 30, 2007. One excursion was noted for Outfall 501 monitoring period October 1 - October 31, 2006 with

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the TSS result at 32 mg/L. Iron and copper were reported as “NA” for Outfall 001 monitoring period June 1 – June 30 2006.

XI. WATER QUALITY CONSIDERATIONS

Subsegment 070201, Mississippi River – from Old River Control Structure to Monte Sano Bayou, is not listed on LDEQ's Final 2006 303(d) List as impaired, and to date no TMDL's have been established. A reopener clause will be established in the permit to allow for the requirement of more stringent effluent limitations and requirements as imposed by any future TMDLs. Outfalls 001, 003, and 004 discharge to subsegment 070201.

Subsegment 120108, False River, is not listed on LDEQ's Final 2006 303(d) List as impaired, and to date no TMDL's have been established. A reopener clause will be established in the permit to allow for the requirement of more stringent effluent limitations and requirements as imposed by any future TMDLs. Outfall 002 discharges to subsegment 120108.

The nearest potable water industrial intake is DOW USA, Plaquemine, on the west bank at 206.9 M.A.H.P., 50.7 miles downstream from the discharge point.

XII. ENDANGERED SPECIES

The receiving waterbody, Subsegment 070201 of the Mississippi River Basin, has been identified by the U.S. Fish and Wildlife Service (FWS) as habitat for the pallid sturgeon which is listed as a threatened species. Consultation with the Service is required if the proposed permit is in sensitive waters and is for an electrical generating facility. Therefore, this draft permit has been submitted to the FWS for review in accordance with a letter dated October 24, 2007 from Boggs (FWS) to Brown (LDEQ). The effluent limitations established in the permit ensure protection of aquatic life and maintenance of the receiving water as aquatic habitat. Therefore, the issuance of the LPDES permit is not likely to have an adverse effect on any endangered or candidate species or the critical habitat.

The receiving waterbody, Subsegment 120108 of the Terrebonne Basin, is not listed in Section II.2 of the Implementation Strategy as requiring consultation with the U.S. Fish and Wildlife Service (FWS). This strategy was submitted with a letter dated October 24, 2007 from Boggs (FWS) to Brown (LDEQ). Therefore, in accordance with the Memorandum of Understanding between the LDEQ and the FWS, no further informal (Section 7, Endangered Species Act) consultation is required. The effluent limitations established in the permit ensure protection of aquatic life and maintenance of the receiving water as aquatic habitat. Therefore, the issuance of the LPDES permit is not likely to have an adverse effect on any endangered or candidate species or the critical habitat.

XIII. HISTORIC SITES:

The discharge is from an existing facility location, which does not include an expansion on undisturbed soils. Therefore, there should be no potential effect to sites or properties on or eligible for listing on the National Register of Historic Places, and in accordance with the "Memorandum of Understanding for the Protection of Historic Properties in Louisiana Regarding

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LPDES Permits" no consultation with the Louisiana State Historic Preservation Officer is required.

XIV. 316b REQUIREMENTS:

This facility does not withdraw surface water for cooling purposes. Source water is provided via an on-site pipeline from three water wells. This facility is not subject to 316b requirements of the CWA.

XV. IT QUESTIONS – APPLICANT RESPONSES

The applicant's IT responses are included in Appendix C.

XVI. TENTATIVE DETERMINATION:

On the basis of preliminary staff review, the Department of Environmental Quality has made a tentative determination to reissue a permit for the discharge described in the application.

XVII. PUBLIC NOTICES:

Upon publication of the public notice, a public comment period shall begin on the date of publication and last for at least 30 days thereafter. During this period, any interested persons may submit written comments on the draft permit and may request a public hearing to clarify issues involved in the permit decision at this Office's address on the first page of the fact sheet. A request for a public hearing shall be in writing and shall state the nature of the issues proposed to be raised in the hearing.

Public notice published in:

Local newspaper of general circulation

Office of Environmental Services Public Notice Mailing List